Outrigger Telescope Project EIS Public Scoping Meeting

January 8, 2004 Waimea YMCA, Waimea, Hawaii

Facilitator Notes

Speaker #1

- Make better use of, share and upgrade existing facilities to avoid the need to expand and further develop.
- The addition of six telescopes is too much; wants to see what's left.
- The development at the summit is adversely affecting the cultural ambiance of the area.
- Use existing knowledge.

Speaker #2 handed out a document to NASA staff for their review and asked for signatures to indicate receipt.

- Mauna Kea is a sanctuary and sacred place.
- Issues relating to the summit and the mountain pre-date NASA's involvement.
- Why wasn't NEPA followed along the way?
- Approval of one telescope somehow turned into 13.
- The observatories leave trash and debris on the mountain.
- Sewage is a concern.
- Is anyone monitoring water quality?
- Use of electricity is not eco-friendly.
- Hawaiians support and respect astronomy.
- The mountain will never be returned to its original state.
- The concerns laid out in the EA are still valid.
- There is a lack of good faith because of numerous un-kept promises.
- Further injustice may lead to civil disobedience.
- While not documented, it's believed that the impact on the Wekiu bug is the result of development on the summit.
- Most of the impact on the summit has already been made; the six Outriggers will likely not cause much more impact.
- As an act of good faith, the EIS should go back to the time before the Outrigger was built, when the area was pristine.

- The project is not good for the environment.
- We are exploring the universe at the expense of the earth.
- NASA is linked with the military.
- Who gets the money?
- Funds from the project should go to support education for Hawaiians and non-Hawaiians.
- Justice and truth cannot be purchased.
- Bring facilities up to standard without taking more land.
- [Rather than focus on the universe] We need to be concerned for mankind, here on earth.
- Hawaiians continue to lose what is theirs.

Speaker #5

- Seek a reasonable and rational approach to moving forward.
- What about the *l`o*?
- There is jurisdictional confusion that's complex and makes it possible for no one to be held accountable.
- What are the consequences if an observatory is not in compliance?
- \$1 per year does not seem fair.
- A portion of the income generated should go to the community.
- There are no cultural or burial plans in place.
- The CDUA and OTP processes are out of alignment.
- The State and Federal EAs are different.
- NASA, CARA and Keck need to think outside the box; pull away from IFA and pursue their own CDUA.
- An organizational management team, should be created, be more than advisory and should include cultural practitioners, environmentalists and others.
- The management plan should address cumulative issues.
- Set aside 1% of the construction budget to support cultural impacts.

- All companies doing business on the mountain are showing disrespect for Native Hawaiians and their ancestors.
- Return the *iwi* (ancestral bones) that have been removed.
- Conduct an investigation of all cultural sites.
- 18 years later is too late for an EIS the damage has been done to the iwi.

- A reference to the Apology Bill was made and that explaining Pacific values to Westerners is difficult.
- Native Cultural Practice laws may impact the process.
- The challenge is seeking solutions to emotional/cultural issues.
- The Western and Pacific definitions of "preservation" differ; Westerners preserve their past, the dead; while Pacific Islanders' past and dead are considered alive.
- Use the mountain in a way that is best for all concerned.
- Government agencies are preventing Hawaiians access to their land.
- Dust from Stryker will affect visibility.
- Consult with native practitioners and be inclusive (beyond just a few) as part of the EIS development process.

Speaker #8

- As an island-based community we have no choice but to respect the land in order to ensure sustainability.
- The observatories provide a window to the heavens; use this to engage, inspire and teach the children.

Speaker #9

- NASA should discontinue the Keck project because of cultural, social and environmental reasons.
- Include the impacts that increased tourism as a result of further development will have on the mountain.
- Where's UHH?
- What impact would detractors have given the resources to mount a campaign?
- Mauna Kea is seen as one of the most spiritual sites in the world; it's not possible to place a value on it and it must be protected.

- Supports astronomy but the historical context must be acknowledged.
- Not confident this can happen.
- NASA is not the problem, UH is.
- The consultation process could have started in '96.
- Residents need to understand the laws in these matters.
- The science perspective is narrow.
- The military is obviously interested in the technology that astronomy offers.

- The change in vistas over the years is shocking.
- Consider the "no build" option.
- Mitigation needs to be adhered to by all observatories.
- Monitor all flora and fauna.
- Reference to the Legislative Auditor's Review of Management on Mauna Kea Summit citing numerous inadequacies of UH's management and DLNR's protection of Mauna Kea's natural resources. Issues included ineffectiveness of piecemeal efforts, poorly implemented plans, failure to address cumulative impacts, need to develop new methods of measuring impacts of future development, consistent monitoring of septic and sewage, lack of recognition of the cultural value of Mauna Kea, lack of timely reports and lack of enforcement.
- In reference to the Contested Case, it was noted that:
 - There is a lack of clarity within UH as to what is required and expected and how to proceed
 - UH has no authority to cite non-compliance.
- The EA does not demonstrate financial commitment or strategies to ensure resource protection.
- The EA needs to identify a reporting schedule, including start and end dates and monitoring activities.
- The EA makes no commitment beyond the construction phase.

Speaker # 12

- NASA does a good job of exploring the heavens and the military wants to take advantage of this.
- Mauna Kea is being used by people who have no connection to or understanding of the significance of the mountain.
- Mitigate the need for new building/construction by making better use of what you have now; replace obsolete equipment with the latest technology.
- Telescopes proliferate the mountain top; astronomy already has more than its share of the mountain.
- Responsibility lies with elected officials.
- Outsiders cannot be expected to understand Hawaii's values.
- Why Hawaii? Why not the continental US?
- It's time for Hawaiians to come together to form self-government to protect its resources
- To continue to proceed at the expense of people is appalling.
- Science and technology represent a division of truth.
- NASA is tampering with the sacred.

- Establish programs and funds to support Hawaii's youth in and out of the schools.
- \$1 per year is not enough.
- Give money to children, they will have to live with the impacts of the mountain.
- There are many questions about what is going on up there? Educate the local people, it's our land.

- As part of the EIS, require scientists to understand the mountain
 - Take classes at UHH
 - Create a connections
 - Each day, as people enter the mountain, go with respect
 - This connectivity could enhance the science.

Speaker #15

- Keck has proven itself to be a good neighbor and trustee.
- The proposed project may not have much impact.
- The problem lies with the management trustee.
- Development on the mountain has reached saturation.
- The only further development that is acceptable is to use existing sites.
- Money is not the issue, it's the management.
- NASA help close the door, set the precedent for others to follow.
- How can an agency be trusted to do right when we had to threaten them with legal action to the EIS?
- Hawaiian astronomy is important to the earth [by teaching people how to navigate]; modern astronomy is important but there's more needed closer to home.
- Funding should not be based on further development; require existing observatories to start paying.

Speaker #16

- A single solution is difficult but compromise is possible.
- Hawaiians understand Westerners but Westerners do not understand Hawaiians.
- Hawaiians come from a place of contentment, whereas Westerners come from a place of competition.

- There is a desire to connect as humans and individuals (vs. as corporate entities).
- Who is NASA? There is no such person. How can you have a conversation or agreement with a fictitious being?
- The EIS bombards people with information and includes programmatic agreements as a way to bypass laws.
- Mitigation measures relating to the Wekiu study need to be enhanced to include more sites, longer time frames, include other species, and different collection methods.
- Cumulative studies should encompass past, present and future activities.
- The 25% of observatory time that is donated to UHH is worth a lot but only benefits a few people; seek a way to provide benefit to the broader community.
- Consider funding the establishment of a management entity and plan.

Written Comments #1

- Specify in the EIS how the proposed mitigation and monitoring activities will integrate into the Mauna Kea Science Reserve Master Plan.
- The EIS should articulate lines of authority for all stakeholder/partners.
- Design opportunities for review and input to management plans by the public, independent of UH and BLNR.
- Guidelines for management should include goals and objectives, benchmarks, clearly delineated responsibilities for inspection, enforcement and reporting, protocols and consequences for dealing with violations, and a community authority made up of Hawaiian practitioners, biologists, archeologists and other scientists and representatives of other group using the mountain.
- A detailed budget, including sources of funding and legally binding agreement obligating the funding, for the lifetime of the project should be included in the EIS.
- Monitoring and mitigation of the species found in the area needs to be broad to include all native species and potentially harmful alien species.
- Habitat restoration on Pu'u Hau Oki should be completed to restore the Wekiu population.
- The Wekiu study process and methodology needs to be amended to improve quality of data.
- A cumulative impacts study of all past, present and future impacts to the area is needed
 in the EIS. Activities to include are impacts to the summit as a result of constructing the
 Keck and Subaru telescopes, dumping of excavated materials, grading of slopes, filling
 and compacting of the crater bottom, infrastructure (water, sewage, fiber and other
 lines, electric, roads, etc.), chemical disposal and spills and introduction of alien
 species.
- A Mauna Kea Environmental Center should be established to conduct research of climate, hydrology, geology, biology and other environmental aspects. The Center could also incorporate Hawaiian cultural issues and educational programs.